



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/087,496	05/29/1998	JAN E. FORSLOW	2372-5	9614

23117 7590 07/17/2003

NIXON & VANDERHYE, PC  
1100 N GLEBE ROAD  
8TH FLOOR  
ARLINGTON, VA 22201-4714

[REDACTED] EXAMINER

NGUYEN, TOAN D

ART UNIT	PAPER NUMBER
2665	19

DATE MAILED: 07/17/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>
	09/087,496	JAN E. FORSLOW
	Examiner Toan D Nguyen	Art Unit 2665

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 07 May 2003.
- 2a) This action is FINAL.                  2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 49-57,60-66,68-75,77-79,115,116 and 118-121 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) 49-57,60-66,68-75 and 77-79 is/are allowed.
- 6) Claim(s) 115,116 and 118-121 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) The proposed drawing correction filed on \_\_\_\_\_ is: a) approved b) disapproved by the Examiner.  
 If approved, corrected drawings are required in reply to this Office action.
- 12) The oath or declaration is objected to by the Examiner.

#### Priority under 35 U.S.C. §§ 119 and 120

- 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some \* c) None of:
1. Certified copies of the priority documents have been received.
  2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) The translation of the foreign language provisional application has been received.
- 15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

#### Attachment(s)

- |  |  |
|--|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                    | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)           | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)  |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ . | 6) <input type="checkbox"/> Other: _____ .                                   |

## **DETAILED ACTION**

### ***Claim Rejections - 35 USC § 112***

1. Claims 49, 66, 77, 115 and 118 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 49 line 3, it is unclear as to what is meant by "may be". The scope of the claim is, therefore, unascertainable. It is suggested to delete it. Similar problem exists in claim 66 line 3; claim 77 line 3; claim 115 line 3 and claim 118 line 3.

### ***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

3. Claims 115-116 and 118-121 are rejected under 35 U.S.C. 102(e) as being anticipated by Fan et al. (U.S. Patent 6,324,165 B1).

For claim 115, Fan et al. disclose large capacity, multicast core ATM switch architecture, comprising:

electronic circuitry configured to merge packets from different sessions with a same quality of service destined for a different mobile radio hosts within a same geographical service area and to assign packets destined for a same geographical service area but with different qualities of service to different priority queues corresponding to the different qualities of service,

wherein the electronic circuitry is configured to remove a large number of packets from a queue having a higher quality of service than a lower quality of service (col. 3 lines 43-50 and col. 23 lines 43-64).

For claim 116, Fan et al. disclose wherein the electronic circuitry is configured to perform the merging using first in first out scheduling except when packets cannot be delivered within a specified time (figure 5, col. 11 lines 25-28).

For claims 118-121, Fan et al. disclose large capacity, multicast core ATM switch architecture, comprising:

electronic circuitry configured to merge packets from different sessions with a same quality of service destined for different mobile radio hosts within a same geographical service area and monitor each of the application flows to determine whether a data transmission volume limited is exceeded, and if so, to discard packets corresponding to an application flow having a lowest quality of service reserved (col. 3 lines 43-50 and col. 23 lines 43-64).

***Allowable Subject Matter***

4. Claims 49, 66 and 77 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

5. Claims 49-57, 60-66, 68-75 and 77-79 are allowed.

6. The following is an examiner's statement of reasons for allowance:

Regarding to claim 49, the prior art fails to teach a combination of the steps of:

establishing a packet session over the radio interface for the mobile radio terminal using radio resources from the pool during which plural application flows are communicated with an external network entity, each application flow having a corresponding stream of packets;

defining a corresponding quality of service parameter for each of the plural application flows such that different quality of service parameters may be defined for different ones of the application flows; and

determining whether radio resources from the pool are available to support the quality of service parameters defined for each of the plural application flows,

wherein establishing the packet session includes:

activating a packet session for the mobile radio terminal so that the mobile radio terminal is in communication with the gateway node, and

the mobile radio terminal requesting an end-to-end configuration between the mobile radio terminal and the external network entity, and

wherein the end-to-end configuration request establishes a network packet layer bearer between the mobile radio terminal and the gateway node permitting relay of data packet between the external network entity and the mobile radio terminal even though a network packet layer address is not assigned to the mobile radio terminal, in the specific combination as recited in the claim.

Regarding to claim 66, the prior art fails to teach a combination of the steps of:

establishing a packet session for the mobile radio host over the radio interface using radio resources from the pool during which plural application flows are communicated between the

Art Unit: 2665

mobile host and an external network entity, each application flow having a corresponding stream of packets;

making a reservation request for a particular quality of service for an individual application flow associated with the packet session;

determining whether the reservation request can be met with radio resources from the pool;

if so, establishing a logical bearer between the mobile radio host and the gateway node to bear plural ones of the individual application flows having different corresponding quality of services;

classifying and scheduling packets corresponding to each application flow from the external network to the mobile radio host over the bearer in accordance with the quality of service corresponding to the application packet stream;

the serving node monitoring each of the application flows from the gateway node to determine whether a data transmission volume limit is exceeded; and

if so, the serving node discarding packets corresponding to an application flow having a lowest quality of service reserved, in the specific combination as recited in the claim.

Regarding to claim 77, the prior art fails to teach a combination of the steps of:

establishing a packet session over the radio interface for a mobile radio host using radio resources from the pool during which plural application flows are communicated with an external network entity, each application flow having a corresponding stream of packets;

Art Unit: 2665

defining a corresponding quality of service parameter for each of the plural application flows such that different quality of service parameters may be defined for different ones of the application flows;

the serving node merging packets from different sessions with the same quality of service destined for different mobile radio hosts within a same geographical service area; and

the serving node assigning packets destined for a same geographical service area but with different qualities of service to different priority queues corresponding to the different qualities of service,

wherein a large number of packets are removed from a queue having a higher quality of service than a queue having a lower quality of service, in the specific combination as recited in the claim.

***Response to Arguments***

7. Applicant's argument filed on May 07, 2003 have been fully considered, but are moot in view of new ground(s) of rejection.

***Contact Information***

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Toan D Nguyen whose telephone number is 703-305-0140. The examiner can normally be reached on Monday- Friday (7:00AM-4:30PM).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Huy Vu can be reached on 703-308-6602. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9314 for regular communications and 703-872-9314 for After Final communications.

Art Unit: 2665

Any inquiry of a general nature or relating to the status of this application or proceeding  
should be directed to the receptionist whose telephone number is 703-305-9600.

T.N.



A handwritten signature in black ink, appearing to read "T.N.", followed by the date "9/14/07" written below it.